

Atlas of breeding birds in the Murgia Alta SPA (Special Protection Area)

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The Murgia Alta SPA is home to a rich and diverse birdlife of terrestrial environments, including numerous breeding species, some of them of Community interest and included in Annex I to Directive 79/409/EEC



Until now, however, information has been almost totally lacking on most breeding species

The Park Authority therefore funded an Atlas of Breeding Birds survey in the SPA, to investigate the numerical consistency and distribution even of commoner species



Eastern sub-Mediterranean dry grasslands of the *Scorzoneralia villosae* (Annex I of the Habitats Directive (92/43/EEC).¹ Ph R. Labadessa - Lama del Monte, Altamura (BA)



We used a survey method adopted throughout Italy for the Mito2000 project to calculate population trends among common diurnal birds in Italy (Fornasari *et al.*, 2002, Rete Rurale Nazionale and LIPU, 2014). The sampling units used were 5x5 km squares, obtained by dividing UTM 10 Km grids into four parts. Within each 5x5 km grid, seven listening points were selected (LPs).

During the 2013 breeding season, surveyors spent 10 minutes at each of the 347 points, which had to lie within the SPA boundaries.

During the 2014 breeding season, play-back was used in 24 of these grids to survey the nocturnal species breeding within the area.

Species	Diffuse species sub-parcel		Common species contacts		Abundant species occurrence	
	n°	%	n°	%	n°	n°/10 LPs
<i>Passer d. italiae</i>	61	85.9	164	47.3	966	27.8
<i>Galerida cristata</i>	60	84.5	194	55.9	379	10.9
<i>Pica pica</i>	59	83.1	162	46.7	446	12.8
<i>Hirundo rustica</i>	59	83.1	121	34.9	411	11.8
<i>Corvus corax</i>	57	80.3	164	47.3	329	9.5
<i>Falco naumanni</i>	47	66.2	111	32	583	16.8
<i>Emberiza calandra</i>	45	63.4	109	31.4	212	6.1
<i>Melanocorypha calandra</i>	43	60.6	163	47	735	21.2
<i>Apus apus/pallidus</i>	43	60.6	97	27.9	1,620	46.7
<i>Parus major</i>	43	60.6	77	22.2	135	3.9
<i>Carduelis carduelis</i>	39	54.9	63	18.2	137	3.9
<i>Lullula arborea</i>	36	50.7	69	19.9	134	3.9
<i>Streptopelia decaocto</i>	33	46.5	69	19.9	145	4.2
<i>Buteo buteo</i>	33	46.5	53	15.3	100	2.9
<i>Upupa epops</i>	32	45.1	59	17	83	2.4
<i>Garrulus glandarius</i>	30	42.3	44	12.7		
<i>Sylvia melanocephala</i>	30	42.3	42	12.1		
<i>Oriolus oriolus</i>	27	38	49	14.1	74	2.1
<i>Sylvia cantillans</i>	26	36.6	34	9.8		
<i>Cyanistes cyaneus</i>	24	33.8	43	12.4	73	2.1
<i>Sylvia atricapilla</i>	24	33.8	37	10.7		
<i>Fringilla coelebs</i>	21	29.6				
<i>Passer montanus</i>	20	28.2				
<i>Serinus serinus</i>	19	26.8				
<i>Calandrella brachydactyla</i>	18	25.4				
<i>Emberiza cirius</i>	16	22.5				
<i>Sturnus vulgaris</i>	14	19.7			283	8.1
<i>Corvus monedula</i>	14	19.7				
<i>Streptopelia turtur</i>	13	18.3				
<i>Columba palumbus</i>	13	18.3				
<i>Coracias garrulus</i>	13	18.3				
<i>Columba livia var. domestica</i>	11	15.5			76	2.2
<i>Falco tinnunculus</i>	11	15.5				
<i>Alauda arvensis</i>	9	12.7				
<i>Merops apiaster</i>	9	12.7				
<i>Lanius minor</i>	9	12.7				
<i>Circus cyaneus</i>	8	11.3				
<i>Burhinus oedipnemus</i>	7	9.9				
<i>Corvus corax</i>	7	9.9				

Species:
42 diffuse (in > 10% of subparcels)
21 common (at > 10% of LPs) and
19 abundant (mean abundance > 1 ind. at 10 LPs)

Species	n°/10 LPs	Species	n°/10 LPs	Species	n°/10 LPs
<i>Apus apus/pallidus</i>	46.7	<i>Sturnus vulgaris</i>	1.4	<i>Milvus milvus</i>	0.2
<i>Passer d. italiae</i>	27.8	<i>Sylvia cantillans</i>	1.3	<i>Falco vespertinus</i>	0.1
<i>Melanocorypha calandra</i>	21.2	<i>Passer montanus</i>	1.3	<i>Circus aeruginosus</i>	0.1
<i>Falco naumanni</i>	16.8	<i>Alauda arvensis</i>	1.2	<i>Turdus viscivorus</i>	0.1
<i>Pica pica</i>	12.9	<i>Columba palumbus</i>	1	<i>Luscinia megarhynchos</i>	0.1
<i>Hirundo rustica</i>	11.8	<i>Streptopelia turtur</i>	0.9	<i>Cettia cetti</i>	0.1
<i>Galerida cristata</i>	10.9	<i>Merops apiaster</i>	0.8	<i>Petronia petronia</i>	0.1
<i>Corvus corax</i>	9.5	<i>Emberiza cirius</i>	0.8	<i>Milvus migrans</i>	0.1
<i>Corvus monedula</i>	8.2	<i>Corvus corax</i>	0.6	<i>Troglodytes troglodytes</i>	0.1
<i>Emberiza calandra</i>	6.1	<i>Circus cyaneus</i>	0.5	<i>Sylvia communis</i>	0.1
<i>Streptopelia decaocto</i>	4.2	<i>Coracias garrulus</i>	0.5	<i>Circus cyaneus</i>	0.1
<i>Carduelis carduelis</i>	3.9	<i>Lanius minor</i>	0.5	<i>Cisticola juncidis</i>	0.1
<i>Parus major</i>	3.9	<i>Falco tinnunculus</i>	0.4	<i>Asio otus</i>	0.1
<i>Lullula arborea</i>	3.9	<i>Aegithalos caedatus</i>	0.4	<i>Picus viridis</i>	0.1
<i>Buteo buteo</i>	2.9	<i>Turdus merula</i>	0.3	<i>Saxicola torquatus</i>	0.1
<i>Upupa epops</i>	2.4	<i>Carduelis chloris</i>	0.3	<i>Acrocephalus arundinaceus</i>	< 0.1
<i>Columba livia var. domestica</i>	2.2	<i>Burhinus oedipnemus</i>	0.3	<i>Cuculus canorus</i>	< 0.1
<i>Oriolus oriolus</i>	2.1	<i>Lanius senator</i>	0.3	<i>Phasianus colchicus</i>	< 0.1
<i>Cyanistes caeruleus</i>	2.1	<i>Carduelis cannabina</i>	0.3	<i>Falco peregrinus</i>	< 0.1
<i>Sylvia melanocephala</i>	1.8	<i>Coturnix coturnix</i>	0.3	<i>Falco subbuteo</i>	< 0.1
<i>Garrulus glandarius</i>	1.8	<i>Sylvia conspicillata</i>	0.3	<i>Monticola solitarius</i>	< 0.1
<i>Fringilla coelebs</i>	1.7	<i>Athene noctua</i>	0.2	<i>Eritrichus rubecula</i>	< 0.1
<i>Calandrella brachydactyla</i>	1.6	<i>Anthus campestris</i>	0.2	<i>Dendrocopos major</i>	< 0.1
<i>Fringilla coelebs</i>	1.6	<i>Oenanthe hispanica</i>	0.2	<i>Muscicapa striata</i>	< 0.1
<i>Delichon urbicum</i>	1.6	<i>Certhia brachydactyla</i>	0.2	<i>Accipiter nisus</i>	< 0.1
<i>Serinus serinus</i>	1.5	<i>Pernis apivorus</i>	0.2	<i>Emberiza melanocephala</i>	< 0.1

Detected species

Species	contacts		occurrence	
	n°	%	n°	n°/10 LPs
<i>Otus scops</i>	14	58.3	46	5.35
<i>Tyto alba</i>	3	12.5	3	0.35
<i>Athene noctua</i>	13	54.2	17	1.98
<i>Asio otus</i>	3	12.5	4	0.47

Nocturnal species

The number of confirmed breeding species was 73, with 2 probable breeders and 7 possible breeders.

CONFIRMED BREEDING SPECIES: *Coturnix coturnix*, *Pernis apivorus*, *Milvus milvus*, *Circus cyaneus*, *Accipiter nisus*, *Buteo buteo*, *Falco naumanni*, *Falco tinnunculus*, *Falco biarmicus*, *Falco peregrinus*, *Burhinus oedipnemus*, *Columba palumbus*, *Streptopelia decaocto*, *Streptopelia turtur*, *Cuculus canorus*, *Tyto alba*, *Otus scops*, *Athene noctua*, *Asio otus*, *Caprimulgus europaeus*, *Apus apus*, *Apus pallidus*, *Merops apiaster*, *Coracias garrulus*, *Upupa epops*, *Picus viridis*, *Dendrocopos major*, *Melanocorypha calandra*, *Calandrella brachydactyla*, *Galerida cristata*, *Lullula arborea*, *Alauda arvensis*, *Hirundo rustica*, *Delichon urbicum*, *Anthus campestris*, *Metacalla alba*, *Troglodytes troglodytes*, *Luscinia megarhynchos*, *Saxicola torquatus*, *Oenanthe hispanica*, *Monticola solitarius*, *Turdus merula*, *Turdus viscivorus*, *Cettia cetti*, *Cisticola juncidis*, *Sylvia atricapilla*, *Sylvia communis*, *Sylvia conspicillata*, *Sylvia cantillans*, *Sylvia melanocephala*, *Aegithalos caedatus*, *Cyanistes caeruleus*, *Parus major*, *Certhia brachydactyla*, *Oriolus oriolus*, *Lanius minor*, *Lanius senator*, *Garrulus glandarius*, *Pica pica*, *Corvus monedula*, *Corvus corax*, *Sturnus vulgaris*, *Passer d. italiae*, *Passer montanus*, *Petronia petronia*, *Fringilla coelebs*, *Serinus serinus*, *Carduelis chloris*, *Carduelis carduelis*, *Carduelis cannabina*, *Emberiza cirius*, *Emberiza melanocephala*, *Emberiza calandra*

PROBABLE BREEDING SPECIES: *Milvus migrans*, *Lanius collurio*

POSSIBLE BREEDING SPECIES: *Phasianus colchicus*, *Pernis apivorus*, *Falco subbuteo*, *Clamator glandarius*, *Dendrocopos minor*, *Eritrichus rubecula*, *Muscicapa striata*

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Aggiornamento degli andamenti di popolazione e del Farmland Bird Index per la Rete Rurale Nazionale dal 2000 al 2013.